



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/583,048	06/15/2006	Amandine Gambin	22080.003	8791
42922 7590 08/12/2009 WHITAKER, CHALK, SWINDLE & SAWYER, LLP 3500 CITY CENTER TOWER II 301 COMMERCE STREET FORT WORTH, TX 76102-4186				
EXAMINER ABU ALI, SHUANGYI				
ART UNIT 1793		PAPER NUMBER		
MAIL DATE 08/12/2009		DELIVERY MODE PAPER		

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

# Office Action Summary

**Application No.**

10/583,048

**Applicant(s)**

GAMBIN ET AL.

**Examiner**

SHUANGYI ABU ALI

**Art Unit**

1793

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 08 May 2009.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-10 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-10 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SF/ICE)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_

## **DETAILED ACTION**

### ***Status of Claims***

Claims 1-10 remain for examination wherein claims 1 and 9-10 are amended.

### ***Claim Rejections - 35 USC § 103***

The rejection of claims 1-4 and 9-10 under 35 U.S.C. 103(a) as being unpatentable over JP09-268012 as generally set forth in the previous office action mailed 02/17/2009 stands.

The text of those sections of title 35 US Code not included in this action can be found in the prior Office Action.

### ***New-ground Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

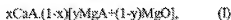
(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

Claims 1, 3, and 5 are rejected under 35 U.S.C. 103(a) as being unpatentable over U. S. Patent No. 4,781,759 to Smith

Regarding claims 1, 3, and 5, Smith disclose a composition comprising limestone (calcium carbonate) and clay such as attapulgite clay. The attapulgite clay amount in the composition is about 2-25%. The size of the clay is in the range of 6-30 mesh (col.3, lines 1-2, claim 1 and abstract). Please note for the following formula



in which

A is a  $\text{-(OH)}_2$  or  $\text{-CO}_2$  group, and

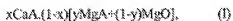
x and y are molar fractions where  $0 < x \leq 1$  and  $0 \leq y \leq 1$ .

When X=1, the compound is calcium hydroxide or calcium carbonate

The reference differs from Applicant's recitations of claims by not disclosing identical ranges (the amount of the clay less than 5%). However, the reference discloses "overlapping" ranges (the clay amount is in the range of 5-25% and about permits some tolerance), and overlapping ranges have been held to establish prima facie obviousness (MPEP 2144.05).

Claims 1-3 and 6 are rejected under 35 U.S.C. 103(a) as being unpatentable over U. S. Patent Publication No. 2003/0138614 to Leclercq.

Regarding claims 1-3 and 6, Leclercq disclose a mixture for a plaster comprising dolomite (calcium carbonate), and 2 to 4% of micronized unexpanded vermiculite, which has a size of less than 1 mm (claim 10, [0067] and [0023]). Please note for the following formula



in which

A is a  $\text{=OH}$ , or  $\text{=CO}_2$  group, and

x and y are molar fractions where  $0 < x \leq 1$  and  $0 \leq y \leq 1$ .

When  $X=1$ , the compound is calcium hydroxide or calcium carbonate

The reference differs from Applicant's recitations of claims by not disclosing identical ranges (the vermiculite size of larger than 90 micron). However, the reference discloses "overlapping" ranges (less than 1 mm), and overlapping ranges have been held to establish prima facie obviousness (MPEP 2144.05).

Claims 7 is rejected under 35 U.S.C. 103(a) as being unpatentable over U. S. Patent Publication No. 2003/0138614 to Leclercq, in view of U. S. Patent No. 5340558 to Friedman et al.

Regarding claim 7, Leclercq disclose a mixture for a plaster comprising dolomite (calcium carbonate), and 2 to 4% of micronized unexpanded vermiculite, which has a size of less than 1 mm (claim 10, [0067] and [0023]).

But they are silent that vermiculite is expanded.

However, it would have been obvious to one of ordinary skill in the art at the time of invention to use expanded vermiculite, motivated by the fact that Friedman et al, disclose that expanded vermiculite has a wide variety of well know use as aggregates in plaster. (col 3, lines 1-5)

Claims 1-3 and 8-10 rejected under 35 U.S.C. 103(a) as being unpatentable over U. S. Patent No. 4,051056 to Hartman et al.

Regarding claims 1-3 and 8-9, Hartman et al. disclose a composition comprises of calcium carbonate and 2-65% of expended perlite, which has a size of 1-190 micron.( abstract , col. 8, lines 9-12, col. 15, line 66, col. 9, lines 6-15))

Since the reference is silent about the impurity of the calcium carbonate, it is reasonable to expect that the calcium carbonate is pure.

Please note for the following formula



in which

A is a  $\text{=OH}$ , or  $\text{=CO}_2$  group, and

x and y are molar fractions where  $0 < x \leq 1$  and  $0 \leq y \leq 1$ .

When  $X=1$ , the compound is calcium hydroxide or calcium carbonate

The reference differs from Applicant's recitations of claims by not disclosing identical ranges (the amount of the perlite less than 5% and particle size of larger than 90 micron). However, the reference discloses "overlapping" ranges (the clay amount is in the range of 2-65% and the particle size of 1-190 micron), and overlapping ranges

have been held to establish prima facie obviousness (MPEP 2144.05).

Regarding claim 10, Hartman et al. disclose that the abrasive such as calcium carbonate has a size of 1-250 micron (col. 15, lines 61-63).

### ***Response to Arguments***

Applicant's arguments filed 05/08/2009 have been fully considered but they are not persuasive. Therefore, the grounds of rejection for claims 1-4 and 9-10 as indicated in the first Office Action stand.

The applicant argues that in the process of making the slaked lime, if any sand is mixed with the slake lime, the sand should have a size as the same as the slake lime. The Examiner respectfully submits that the prior art discloses that the sand size is in the range of 100-1500 micron. And in the example the medium size is 460 micron. The smallest size of the sand is 100 micron. Second, the applicant fails to provide any facture evidence to show that sand particle with a size of 50 micron or less is in the composition. Attorney's argument can not take the place of the evidence.

### ***Conclusion***

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to SHUANGYI ABU ALI whose telephone number is (571)272-6453. The examiner can normally be reached on Monday - Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jerry Lorengo can be reached on 571-272-1233. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.



Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/J.A. LORENZO/  
Supervisory Patent Examiner, Art Unit 1793

/Shuangyi Abu-Ali/  
Examiner, Art Unit 1793